Nutrient Management Act, 2002

Nutrient Management Strategies and Horse Barns

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Factsheet

ORDER NO. 10-057 AGDEX 720/538 JULY 2010

Building a horse barn is a significant undertaking. Before starting your project, decide how you're going to manage the manure. Under the regulations of the *Nutrient Management Act,* 2002, farmers must have an approved nutrient management strategy (NMS) before applying for a building permit for facilities for housing horses or for manure storage on farms with greater than 5 nutrient units (Figure 1 shows one type of manure storage). The NMS sets out the environmentally acceptable methods for managing manure and runoff generated on the farm.

Figure 1. A 3-walled manure storage with reinforced concrete walls, located close to the barn.

NUTRIENT MANAGEMENT STRATEGIES

A nutrient management strategy (NMS) identifies:

- how much manure is produced and stored on the farm
- contact information for the owner and operator of the farm
- siting of new barns and manure storage facilities in relation to sensitive features such as wells and surface water
- how runoff is managed
- an overview of the landbase that the manure is applied to or other locations
- a contingency plan for unforeseen circumstances or emergencies

Farms with greater than 5 nutrient units (NU) require an NMS before any of the following occurs:

- submitting an application for a building permit for a building or structure used to house horses or store manure (An approved NMS is also required in these situations in unorganized townships even though a building permit is not required.)
- constructing or excavating any earthen manure storage (e.g., lagoon), including expansions of existing earthen storages
- constructing an anaerobic digester that is regulated under the NMA
- reaching livestock numbers of 300 NU or greater on the farm unit (or for a farm with 300 or more NU)

Approval of the NMS by OMAFRA is required for farms that meet any of the first three scenarios listed and for the fourth scenario if a municipal well is located within 100 m (328 ft) of the farm property.

Nutrient units are calculated based on the number of livestock on a farm unit. A nutrient unit (NU) is defined as the number of animals that will give the fertilizer replacement value of the lower of 43 kg of nitrogen or 55 kg of phosphate per year as nutrients. Fortunately for owners of horses and most species of livestock and poultry, the calculations have been completed and can be found in the Nutrient Management Tables in Ontario Regulation 267/03. Table 1 shows how to calculate a farm's nutrient units based on the types of horses housed.

Ministry of Agriculture, Food and Rural Affairs

Ontario

Table 1. Nutrient units

Type of horse (unweaned foals are included with the mares)	NU factor	Number of animals needed to exceed 5 NU
Small framed (i.e., Shetland pony)	2	11
Medium framed (i.e., typical riding or pleasure horse)	1	6
Large framed (i.e., Clydesdale or Belgian)	0.7	4

For farms with other livestock species and/or mixed livestock operations, call the toll-free Nutrient Management Information Line at 1-866-242-4460 for further information.

There are a few situations where a Nutrient Management Plan (NMP) is also required. The NMP details how manure, fertilizer and other nutrients are applied to a given land base. It is a five-year plan that lists the characteristics of the land, crop rotation, and cropping and nutrient application practices. It enhances the use of nutrients by crops in the field and reduces environmental impacts. An NMP is required:

- on farms with 300 NU or greater
- if an NMS is required and the farm is located within 100 m (328 ft) of a municipal well

Because there are relatively few equine farms that are required to have NMPs in Ontario, this Factsheet will focus on the requirements for an NMS.

NMS PREPARATION AND APPROVAL

Nutrient management strategies must be prepared by an individual certified under the regulations of the *Nutrient Management Act,* 2002. There are two choices for certification for a farmer:

- Take the necessary courses to prepare the NMS.
- Hire a certified consultant to prepare the NMS.

See the OMAFRA website for a list of certified consultants. Once the NMS has been prepared, send it to OMAFRA in Guelph for approval.

Farmers preparing their own NMS can use the NMAN software available from OMAFRA. A two-day training course is offered on how to use NMAN. Another option is to use the OMAFRA *Nutrient Management Strategy Preparation Workbook* to work through the NMS on paper. (To order a copy, contact the Ridgetown Campus of the University of Guelph at 519-674-1619, or toll free 1-877-480-9992.)

For more information on consultants, nutrient management courses or who to contact for information on nutrient management, call the toll-free Nutrient Management Information Line at 1-866-242-4460 or see the Nutrient Management section at www.ontario.ca/omafra.

IMPLEMENTING THE NMS

The NMS is a legally binding document. Once the building permit has been applied for, the manure must be managed in accordance with the NMS. For example, if the NMS indicates that manure is going to be picked up regularly by a certified broker, the farmer is under a legal obligation to have the manure picked up by a broker. If the situation has changed and the broker is not able to pick up the manure, the farmer is still legally obliged to manage the manure in accordance with the approved NMS. A contingency plan worked into the NMS helps the farmer adjust and change over time while still meeting regulatory obligations.

An NMS is valid for up to 5 years. During that time, the farmer is required to review the NMS, summarize the activities of the previous year, keep a written record of this summary and note any updates to the NMS for the upcoming year, by February 15 of each year.

At least 90 days before the fifth anniversary of the NMS, the farm must have the NMS for the next 5-year period, prepared by a certified person on file.

At any time, farmers planning a change on the farm that would require an NMS — for example, adding livestock housing or manure storage facilities — must submit a revised NMS, prepared by a certified person, for approval before making any changes to the farm.

CONCLUSION

Prepared prior to obtaining the building permit, a nutrient management strategy proactively addresses manure management for horse barn facilities. It takes into consideration nearby water resources, manure storage capacity, runoff management, land application and other destinations for the manure from your farm, along with a contingency plan. The benefits of a well thought-out NMS can be realized for years after construction is completed. Integrating manure storage and runoff management at the start of the project reduces risk to nearby water resources, reduces the potential for complaints from neighbours and improves the ease with which daily chores are completed.

REFERENCES

Nutrient Management Strategy Preparation Workbook, OMAFRA.

OMAFRA Factsheets

Manure Storages for Small- to Medium-Size Horse Farms, Order No. 07-045

Nutrient Management Act, 2002: Handling Runoff From Solid Agricultural Source Material Storages and Outside Livestock Areas, Order No. 10-005

Building Permit Requirements for Livestock Operations, Order No. 07-063

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Do you know about Ontario's *Nutrient Management Act*?

The provincial *Nutrient Management Act* (*NMA*) and Regulation 267/03, as amended, regulate the storage, handling and application of nutrients that could be applied to agricultural crop land. The objective is to protect Ontario's surface and groundwater resources.

Please consult the regulation and protocols for the specific legal details. This Factsheet is not meant to provide legal advice. Consult your lawyer if you have questions about your legal obligations.

For more information on the *NMA* call the Nutrient Management Information Line at 1-866-242-4460, e-mail **nman.omafra@ontario.ca** or visit **www.ontario.ca/omafra**

Factsheets are continually being updated, so please ensure that you have the most recent version.

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ISSN 1198-712X
Également disponible en français
(Commande nº 10-058)